Ser. No. 09/679,970   - 2 -
Response to Office Action of 3/15/2005
Atty Docket 116734-8

AMENDMENTS TO THE SPECIFICATION

Please replace the paragraph beginning on page 7, line 17 and continuing on page 8, with the following amended paragraph:

FIG. 2 refers to an illustration of the curvatures utilized in an orthokeratology contact lens. The present invention includes a central base curve 12 and is shown with a line segment that is referred to as the lens' central axis 30. This central axis 30 begins at the apex 32 of the central base curve 12 and terminates at point 34 and serves as a reference point for the center of the contact lens 10. The line segment that is bounded by points 32 and 34 defines the radius of curvature 33 associated with the central base curve 12. Orthokeratology contact lenses use a flatter central base curve than that of the patient's cornea. Using conventional manufacturing processes with the curvatures of these zones being coaxial, the first annular zone must have a radius of curvature less than that of the central base curve 12 in order to bring the central base curve surface of the orthokeratology contact lens back toward the surface of the cornea. This fact is illustrated by the radius of curvature defined by the straight line distance between points 38 and the apex 40 of reverse zone curve 42 which is less than the radius of curvature 33 of central base curve 12. The typical reverse curve geometry is confined to designing lenses that use curves for the first annular or reverse zone 14 that have their origin of curvature located on the central axis 30 of the central base curve 12. Such a constraint is not placed on the [[lends]] lens design according to the present invention. Thus, the first annular zone 14 may be embodied by a first annular curve 44 that does not have its origin of curvature located on the central axis 30 of the central base curve 12, but instead origin 46 may lie on axis 47. In addition, the radius of curvature of this off-axis reverse zone curve 44 can have a radius of curvature that is greater than the radius of curvature of central base curve 12.

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